APPENDIX K – BUREAU OF LAND MANAGEMENT MITIGATION GUIDANCE

Mitigation

The Bureau of Land Management (BLM) may require mitigation measures and conservation actions to achieve land-use plan goals and objectives and provide for sustained yield of natural resources on public lands, while continuing to honor the agency's multiple-use missions. The sequence of mitigation action would be the mitigation hierarchy (avoid, minimize, rectify, reduce or eliminate over time, compensate) as identified by the White House Council on Environmental Quality (40 Code of Federal Regulations 1508.20) and BLM's *Draft - Regional Mitigation* Manual Section 1794. Certain alternatives also may identify compensatory mitigation requirements for those implementation level activities whose impacts the agency(s) cannot adequately avoid, minimize, rectify, reduce, or eliminate over time (i.e., residual impacts).

The priority is to mitigate impacts at the site of the activity in conformance with the land-use plan goals and objectives through impact avoidance, minimization, rectification, and reduction over time of the impact, including those measures described in laws, regulations, policies, and land-use plans. When these types of mitigation measures are not sufficient to ameliorate anticipated direct, indirect, and cumulative impacts and substantial or significant residual impacts remain, additional measures to reduce these residual impacts to meet applicable land-use plan goals and objectives would be required (compensatory mitigation).

The Project would apply the mitigation hierarchy and would identify or incorporate by reference applicable land-use plan mitigation measures for:

Avoiding

- Identification of avoidance areas and/or measures (e.g., right-of-way avoidance areas, no surface occupancy areas) already included in laws, regulations, and/or governmental decision documents (e.g., BLM resource management plans [RMPs], state, tribal, or county plans that govern site or permit authorizations)
- Identification of additional avoidance measures for the BLM to consider (e.g., additional avoidance best management practices)

Minimizing

- Identification of minimization measures (e.g., surface-use controls, conservation measures, best management practices) already included in BLM decision documents (e.g., RMPs; U. S. Fish and Wildlife Service Biological Opinions, other Project decision documents and right-of-way authorizations)
- Identification of additional minimization measures for the BLM to consider (e.g., Applicant-committed design features)

Rectifying

- Identification of measures for the BLM to consider, including repairing, rehabilitating, or restoring affected landscapes
- Reducing or eliminating
 - Identification of measures for the BLM to consider for reducing or eliminating the impact over time by preservation and maintenance operations during the life of the action

Compensating

• Identification of measures for the BLM to consider for compensating for the impact by replacing or providing substitute resources or environments

When applying mitigation at any level of the mitigation hierarchy, there would be requirements for monitoring the effectiveness of the mitigation as well as the durability of the mitigation. This monitoring is necessary, especially in relation to durability for compensatory mitigation to identify when it may be appropriate to consider applying adaptive management concepts to ensure continued durability for the life of the Project.

Two important concepts related to durability are (1) ecological durability, the length of time the benefits from mitigation measures persist on and influence the landscape and meet or exceed the length of time that projected impacts would affect resources and (2) protective durability, ecological values in compensatory mitigation Project areas that are unaffected by future and conflicting land-uses or disturbances.

The ecological durability of compensatory mitigation is greatest if the projects are large enough or properly located so they would, either in themselves or in conjunction with other projects, adjacent landscape conditions, or climate change predictions, provide the targeted conservation benefits.

Ecological durability may be compromised when the benefits of compensatory mitigation do not persist for the full duration of the impact intended to be offset (i.e., from initial surface disturbance to final reclamation, rehabilitation, or restoration). Damage to functioning compensatory mitigation measures may be caused by natural disturbances (such as wildfire) or anthropogenic disturbances (such as other authorized development), which shorten the intended duration of applicable mitigation.

The BLM would require that mitigation measures have a degree of protective durability. Financial protections (e.g., bonding for construction, endowment for mitigation management) are an important tool to achieve protective durability. The BLM would expressly condition its approval of the Project on the Applicant's commitment to perform or cover the costs of mitigation, both onsite and outside the area of impact.

Examples of compensatory mitigation include creation or restoration of wetlands; offsite vegetation treatments to improve sage-grouse or migratory bird habitat; purchase of property or conservation easements to provide long-term protection for sage-grouse or migratory bird habitats; or appropriate mitigation for impacts to designated National Scenic and/or Historic Trails or those trails recommended as suitable for congressional designation.